# SAF-RC-001 **Industrial Hygiene Sampling** FINAL DATA

NO DISTRIBUTION REQUIRED

**COMMENTS:** 

SAF-RC-001

Rad only X Chem only

Rad & Chem

X Complete

**Partial** 

300 Area 303M Bldg







### Cover Page

Report Identification Number: 06I-0133-01

Subcontract Number: 0000X-BO-G0058-B-Mod#4

Name of Industrial Hygienist: Denise A. Pitts / Henry W. Ruby

Laboratory Identification Number: DCHM

SAF#: RC-001 / R303M0 J451

Payroll#: 73513

Web Page: www.datachem.com

E-mail: lab@datachem.com

Sample Information

Sample Date	Customer Sample Number	Laboratory Sample Number	Method	Analytical Batch Identification	Sample Matrix
11 Jan 2006	J10RR6	06100925	NMAM 7300M	G060D00V	G WIPE
11 Jan 2006	J10RR7	06100926	NMAM 7300M	G060D00V	G WIPE
11 Jan 2006	J10RR8	06I00927	NMAM 7300M	G060D00V	G WIPE

I certify that this electronic image and all hardcopies produced from this image accurately represent the data and are in compliance with the contract specific requirements, both technically and for completeness, other than the conditions detailed above or in the sample data package narrative. Release, by submission through email, the data contained in this electronic image and the computer-readable EDD (as applicable), has been authorized by the laboratory Manager or the Manager's designee.

Phone: (801) 266-7700

FAX: (801) 268-9992

Name: Lisa M. Reid Title: Chemist

Date: January 16, 2006





#### Case Narrative Page

Report Identification Number: 06I-0133-01

Subcontract Number: 0000X-BO-G0058-B-Mod#4

Name of Industrial Hygienist: Denise A. Pitts / Henry W. Ruby

Laboratory Identification Number: DCHM

SAF#: RC-001 / R303M0 J451

Payroll#: 73513

General Set Information: There are 4 samples in set 06I-0132-02 and 3 samples in set 06I-0133-01. The samples were analyzed for cadmium, lead and beryllium on Ghost Wipe. No problems were encountered with the receipt of these samples and no contact with the CTR was required.

Method Summary: Samples were transferred to 50 ml centrifuge tubes and digested in the presence of 5 mL of nitric acid and 5 mL of ASTM Type II water. Samples were digested in a hot block set at 110°C for 60 minutes. Samples were then diluted to a 25 mL volume with ASTM Type II Water. Samples were shaken and delivered for ICP analysis.

Sample Preparation: All samples were prepared in accordance with DCL SOP "IH-AN-021" and NIOSH method NMAM 7300 modified for hot block digestion.

Holding Times: The holding times were met for both sample preparation and analysis.

Instrument Calibration: Instrument calibration was performed in accordance with NIOSH method NMAM 7300.

Initial and Continuing Calibration Verification Analysis: Beryllium, cadmium and lead recoveries in all Initial Calibration Verification (ICV) and Continuing Calibration Verification (CCV) samples are within the quality control limits of ± 10%.

Initial and Continuing Calibration Blank Analysis: No beryllium results were found in the Initial Calibration Blank (ICB) or Continuing Calibration Blanks (CCB) at levels above the Contract Required Detection Limits (CRDL) of 0.01 ug/sample. No cadmium results were found in the Initial Calibration Blank (ICB) or Continuing Calibration Blanks (CCB) at levels above the Contract Required Detection Limits (CRDL) of 0.07 ug/sample. No lead results were found in the Initial Calibration Blank (ICB) or Continuing Calibration Blanks (CCB) at levels above the Contract Required Detection Limits (CRDL) of 2. ug/sample.

Method Blank Analysis: No beryllium, cadmium or lead was found in any of the media blank samples above the Contract Required Detection Limit (CRDL).

Phone: (801) 266-7700

FAX: (801) 268-9992

Web Page: www.datachem.com

E-mail: lab@datachem.com

**Dilution(s):** None





## Case Narrative Page

Laboratory Control Sample and Duplicate Analysis: One Laboratory Control Sample (LCS) and one Laboratory Control Sample Duplicate (LCSD) were prepared and analyzed with the sample batch. The LCS results were within the control limits of ± 20%. The Relative Percent Difference (RPD) between the LCS and the LCSD were within the control limit of 20%.

Replicate Analysis: One sample in this batch was replicated. The RPD between the sample and the replicate was within the control limit of 20%. If the result of the sample or replicate is below the CRDL, replicate analysis is negligible.

Flagging Codes: None

Nonconformance/Corrective Action Report (NC/CAR): N/A

Sample Calculation: The final results are calculated by the following equation:

Final result for acqueun semples (ug/semple) = (A) v (B) v (C)

Final result for aqueous samples ( $\mu$ g/sample) = (A) x (B) x (C)

Where:

A = Analyte concentration from instrument determination ( $\mu g/L$ )

B = Concentration factor from sample preparation

= <u>Final Volume of Digestate (L)</u> Sample

C = Dilution performed at time of analysis

Example Calculation:  $(1 \mu g/L) \times (0.025 L/sample) \times (1) = 0.025 \mu g/sample$ 

Phone: (801) 266-7700

FAX: (801) 268-9992

Web Page: www.datachem.com

E-mail: lab@datachem.com

Miscellaneous Comments: None





# Report Page

Report Identification Number:

06I-0133-01

Subcontract Number: 0000X-BO-G0058-B-Mod#4

Name of Industrial Hygienist: Denise A. Pitts / Henry W. Ruby

Laboratory Identification Number: DCHM

SAF#: RC-001 / R303M0 J451

Payroll#: 73513

Customer Sample Number	Laboratory Sample Number	Date Analyzed	Berylliun µg/sample	- 1	Cadmiun μg/sampl	- 1	Lead μg/sampl	e
J10RR6	06I00925	13 Jan 2006	< 0.01	U	< 0.07	U	<2.	U
J10RR7	06100926	13 Jan 2006	< 0.01	U	< 0.07	U	<2.	U
J10RR8	06100927	13 Jan 2006	< 0.01	U	< 0.07	U	<2.	U
	Limit of I	0.	.01	0.	.07		2.	
R	equired Detect							

Phone: (801) 266-7700

FAX: (801) 268-9992

Web Page: www.datachem.com

E-mail: lab@datachem.com

U - Parameter not detected above LOD.

J - Parameter between LOD and RDL.





## QC Summary Page

Report Identification Number: 06I-0133-01

Subcontract Number: 0000X-BO-G0058-B-Mod#4

Name of Industrial Hygienist: Denise A. Pitts / Henry W. Ruby

Laboratory Identification Number: DCHM

SAF: RC-001 / R303M0 J451

Payroll#: 73513

Batch ID: G060D00V

QC Sample ID	QC Type	Analyte	Units	Result	Parent Result	Target	Percent Rec.	Relative Percent Diff.
BL-240031-1	MB	Beryllium	1	ND				
	· · · · · · · · · · · · · · · · · · ·		μg/sample		NA	NA	NA NA	NA
BL-240031-1	MB	Cadmium	μg/sample	ND	NA	NA	NA	NA
BL-240031-1	MB	Lead	μg/sample	ND	NA	NA	NA	NA
QC-240031-1	LCS	Beryllium	μg/sample	10.8	NA	10.0	108.	NA
QC-240031-1	LCS	Cadmium	μg/sample	32.0	NA	30.0	107.	NA
QC-240031-1	LCS	Lead	μg/sample	98.7	NA	100.	98.7	NA
QD-240031-1	LCSD	Beryllium	μg/sample	11.0	10.8	10.0	110.	1.88
QD-240031-1	LCSD	Cadmium	μg/sample	32.7	32.0	30.0	109.	2.09
QD-240031-1	LCSD	Lead	μg/sample	102.	98.7	100.	102.	2.92
BL-240030-1	MB	Beryllium	μg/sample	ND	NA	NA	NA	NA
BL-240030-1	MB	Lead	μg/sample	ND	NA	NA	NA	NA
BL-240030-1	MB	Cadmium	μg/sample	ND	NA	NA	NA	NA
QC-240030-1	LCS	Beryllium	μg/sample	10.6	NA	10.0	106.	NA
QC-240030-1	LCS	Lead	μg/sample	105.	NA	100.	105.	NA
QC-240030-1	LCS	Cadmium	μg/sample	32.8	NA	30.0	109.	NA
QD-240030-1	LCSD	Beryllium	μg/sample	10.7	10.6	10.0	107.	1.01
QD-240030-1	LCSD	Lead	μg/sample	108.	105.	100.	108.	2.51
QD-240030-1	LCSD	Cadmium	μg/sample	33.1	32.8	30.0	110.	0.922

MB - Method Blank

LCS - Laboratory Control Sample

LCSD - Laboratory Control Sample Duplicate

MS - Matrix Spike

MSD - Matrix Spike Duplicate

LD - Laboratory Duplicate

NA - Not Applicable

ND - Parameter not detected above LOD

LCS, LCSD Percent Rec. = (Result / Target) \* 100.0

DataChem Laboratories, Inc.

960 West Levoy Drive

Salt Lake City, Utah 84123-2547

Phone: (801) 266-7700

FAX: (801) 268-9992

Web Page: www.datachem.com

E-mail: lab@datachem.com



Web Page: www.datachem.com

E-mail: lab@datachem.com



# QC Summary Page

Phone: (801) 266-7700

FAX: (801) 268-9992

MS, MSD Percent Rec. = ((Result - Parent) / Target) \* 100.0

LCS, LCSD Relative Percent Diff. = ((|LCS - LCSD|) / ((LCS + LCSD)/2.0)) \* 100. MS, MSD Relative Percent Diff. = ((|MS - MSD|) / ((MS + MSD)/2.0)) \* 100. LD Relative Percent Diff. = ((|Parent - LD|) / ((Parent + LD)/2.0)) \* 100



# **COC** Page

OLET-0133-01,02	CHAIN OF CUSTODYSAMPIFA ANALYSIS DE	Telephone No. Project Coordinator   Project Coordinator	SAFIN	All referent Ools must be provided: RC-001 R303MO 7451 Method of Section 2451	IFIC: FED EX	NIOSH 1270	854/ 4327 5210	0/0//0/		97 07	Boyllies	Airborne Airborne Wipe Mold Land Land Land	┼─	14 71, X X ng ng	X X X			N A N	20 × × 20 × × × 00	70 × ×	× :	*			100
	CHAIN OF	Company Conlact Dense A. Pitts and Henry W. Ruby	Sampling Location	300 Area 303 M Puilding	Wipe Sample Media:	Ghost [2] Yes   100	MATER		WIPE	SAMPLE ANALYSIS	OLUME (	Arts Cal	do NA Bank	1000	2	NA Blank	NA Blank	<u>4</u>	Z Z	280L personal	Jale Deserve	┼-	\$ 70-11-1		
			и <b>т</b>	, , , , ,		15.	AARKS		ndor Storage W1	SAMPLE	MATRIX SAMPLE DATE	<del> </del>	90-11-1	ĘM.	-	103	*	4		¥	× 1 2 6	$\frac{1}{2}$		005)	
# F F F F F F F F F F F F F F F F F F F	Collection	Select Trees	73513	Type of Sample:		Sat lake Ch	POSSIBLE SAMPLE	20,00	A/A		SAMPLE NO.	9	JIOKKG	JORRT.	- Kooul	242	JIDMINS.	JIDWOY!	T 121.1650	7,0001	TIOMYS	1		VCH-SH-202 (08/29/2005)	

DataChem Laboratories, Inc. 960 West Levoy Drive Salt Lake City, Utah 84123-2547 Phone: (801) 266-7700 FAX: (801) 268-9992 Web Page: www.datachem.com E-mail: lab@datachem.com



	_			CHAIN	OF C	USTODY/S	SAMPLE	ANALY	SIS RI	EQUEST		<del></del>	<del></del>				
Collector: Company Contact Denise A. Pitts and Henry W. Ruby							Telephone 531-12			Project Coordin Joan H. Kessne		Data Turn	around				
Tune of Sample							OAs must be pr			SAF No. RC-001		24 Hour					
Air and w	ir and wives 303M building ANALYSIS							10 J451 Method of Shipment IETHOD (SPECIFIC): FED EX									
Data Chem	ipped To:  Wipe Sample Media:  Ghost Di Yes D No  Other  Other					NIOS	5H 730	Δ		Bill of Lading/		933	75	318			
POSSIBLE SAMPLE I Be Pb, C Special Handling an	HAZARD/REMARK	S	MATI A - Alf WI - WII X - OTI	PE P		ı (i.e., cooling ed, etc.)	No	No	No	No	No	41 9337 5318 NO NO NO NO					
SAMPLE NO.	MATRIX	T	LE ANALY PLE DATE	VOLUME (L) of Area cm <sup>2</sup>	, ,	Comments	Asbestos Airborne	Lead Airborne	Berylliu Airborn		um Lead Cadmium Cadmium						
JIORRIA	WI	1-	11-06	NA	72	lank				×	na	Х	×	ne	na		
JIORR7	WI	ļ		100cm	١	NK	1-11-06	*		×	na	X	×	na	na		
JIORRS	WI	<u> </u>		NA	Bla	ank				×	na	X	<u> </u>	na	na		
JOWN5	4	ļ	<u> </u>	NA	Bk	ank	na	X	X		49	 		×	na		
JIDWVI	<u> </u>			NA	BIC	ink	na		×		1-11-06			X	na		
JIOWYZ	A	ļ	<u> </u>	280L	pe	rsonal	na	X	*					X	na		
JIOWY3	A	1-11	406	276L	per	sonal	na	У	X			DY		X	na		
		_			પ	<u>×j</u>				6		U			<u> </u>		
					1-	11-06					FIEL	D SAN	PLE (	OPY	<b>_</b>		
		<u></u>				<del></del>	<del></del>	L	<u> </u>		<u> </u>	1		<u> </u>			

JIORRY	
--------	--

CHAIN OF CUSTODY/SAMPLE ANALYSIS REQUEST SIGN/PRINT NAMES/USE MILITARY TIME										
Retiniqueshed by/Stored:	DATE / TIME	Received By/Surest	DATE/TIME							
Aftell My total Tores	1-11-06 1530	3746 Building Rm 16, locked carriet	- 1-11 de 1530							
\$140 Burling Rys#16 locked buil	ding DATE / TIME	Record By/Sured:	DATE / YOME							
Golde Malla Goldie Malhan	01-12-06 1445 DATE/TIME	RZ Steffler A? Steff	1-12-06 1445							
RZ Steffler A.Z. Stell	WCH 1-12-06 1575	Fed Ex	DATE/TIME							
Retumper-heat By/Sirveol.	DATE / TIME	Received By/Sugat:	DATE / YIME							
Returquished By/Streed:	DATE / TIME	Received By/Surret	DATE / TIME							
Relungar-bed By/Stored	DATE / TIME	Received By/Sterest	DATE / TIME							
Retinquished By/Snack	DATE / TIME	Reserved By/Storpe:	DATE/TIME							
Retarque-hed By/Suveril	DATE / TIME	Received By/Sureal:	DATE/11ME							
Reinsquebed by/Stered.	DATE / TIME	Reserved By/Steped:	DATE / TIME							
Relinquished By/Shired.	DATE / TIME	Received By/Storesk	DATE / TIME							
LABORATORY Received By SECTION	Title		DATE / TIME							
REVIEWED BY:	PRINT/SIGN NAME	DATE:								